

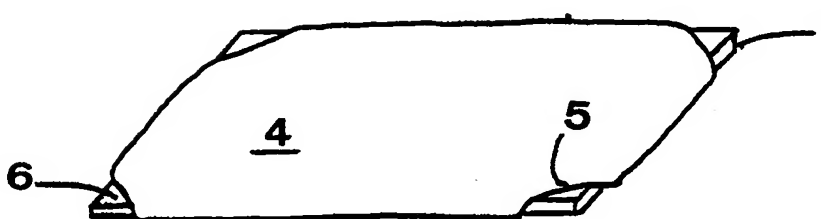


INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(51) International Patent Classification ⁶ : A47L 23/26, 23/24	A1	(11) International Publication Number: WO 99/17654 (43) International Publication Date: 15 April 1999 (15.04.99)
(21) International Application Number: PCT/NL98/00548 (22) International Filing Date: 22 September 1998 (22.09.98) (30) Priority Data: 1007196 2 October 1997 (02.10.97) NL (71)(72) Applicant and Inventor: BURKI, Harmen, Alexander [NL/BE]; 16 Damhertenlaan 16, B-2970 's-Gravenwezel (BE). (74) Agent: MERKELBACH, B.; Van Ruysdaellaan 47, NL-2264 TK Leidschendam (NL).		(81) Designated States: US, European patent (AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE). Published <i>With international search report.</i> <i>In English translation (filed in Dutch).</i>

(54) Title: COVER SHEET FOR A DOOR MAT**(57) Abstract**

The invention concerns a cover sheet (2, 4) for use as a cover of a walking surface, in particular a door mat (1). The cover (2, 4) according to the invention has sufficient capacity for absorption of dirt and/or water and is provided with attachments to enable the cover sheet (2, 4) to be arranged in a rather tight



and smooth manner around the walking surface to keep it in place. The cover sheet (2, 4) is made washable; it can also be impregnated with an agent. The cover sheet (2, 4) has application possibilities for homes, garden and kitchen, but also for industrial purposes. The invention also concerns a combination of door mat (1) and a cover sheet (2, 4) according to the invention.

FOR THE PURPOSES OF INFORMATION ONLY

Codes used to identify States party to the PCT on the front pages of pamphlets publishing international applications under the PCT.

AL	Albania	ES	Spain	LS	Lesotho	SI	Slovenia
AM	Armenia	FI	Finland	LT	Lithuania	SK	Slovakia
AT	Austria	FR	France	LU	Luxembourg	SN	Senegal
AU	Australia	GA	Gabon	LV	Latvia	SZ	Swaziland
AZ	Azerbaijan	GB	United Kingdom	MC	Monaco	TD	Chad
BA	Bosnia and Herzegovina	GE	Georgia	MD	Republic of Moldova	TG	Togo
BB	Barbados	GH	Ghana	MG	Madagascar	TJ	Tajikistan
BE	Belgium	GN	Guinea	MK	The former Yugoslav Republic of Macedonia	TM	Turkmenistan
BF	Burkina Faso	GR	Greece	ML	Mali	TR	Turkey
BG	Bulgaria	HU	Hungary	MN	Mongolia	TT	Trinidad and Tobago
BJ	Benin	IE	Ireland	MR	Mauritania	UA	Ukraine
BR	Brazil	IL	Israel	MW	Malawi	UG	Uganda
BY	Belarus	IS	Iceland	MX	Mexico	US	United States of America
CA	Canada	IT	Italy	NE	Niger	UZ	Uzbekistan
CF	Central African Republic	JP	Japan	NL	Netherlands	VN	Viet Nam
CG	Congo	KE	Kenya	NO	Norway	YU	Yugoslavia
CH	Switzerland	KG	Kyrgyzstan	NZ	New Zealand	ZW	Zimbabwe
CI	Côte d'Ivoire	KP	Democratic People's Republic of Korea	PL	Poland		
CM	Cameroon	KR	Republic of Korea	PT	Portugal		
CN	China	KZ	Kazakstan	RO	Romania		
CU	Cuba	LC	Saint Lucia	RU	Russian Federation		
CZ	Czech Republic	LI	Liechtenstein	SD	Sudan		
DE	Germany	LK	Sri Lanka	SE	Sweden		
DK	Denmark	LR	Liberia	SG	Singapore		
EE	Estonia						

Cover sheet for a door mat

The invention concerns a cover sheet for use as a cover of a walking surface, in particular for a door mat.

5

Mats are being used to wipe off or absorb respectively dirt and/or moist attached to footwear. As a disadvantage relatively a great amount of dirt and under humid circumstances a lot of water is still being taken in. Using the expression of a mat or a door mat also meant are all such objects, e.g. footplanks, brushes, punched out sheets and the like with which one can wipe off dirt sticking to one's footwear or feet.

10

The purpose of the invention is to neutralize this disadvantage and thereby provides for a usable put on top "mat", in particular a complete or partial cover sheet, which has such characteristics as a walking surface that after using it few or no dirt and/or moist at all is being taken in. To that purpose the cover sheet according to the invention is provided with first means enabling attachment of the cover sheet to and circumferentially around the walking surface in a rather tight and smooth manner with the purpose to keep it in place in relation to the walking surface while even if it is intensively used.

15

20

By using these characteristics of the cover sheet according to the invention after walking on the walking surface the wiped off sole becomes clean and dry.

25

The second attachment means on the cover sheet by means of which it rather tightly fits around the door mat to remain in place while being used, can of course be of various types. The cover sheet can e.g. be provided with cord or tape, whether or not elastically attached around its circumference in a hem. After pulling it tight there will be no folds or wrinkles on the upper walking surface that could affect optimal wiping off of the soles. Also the cover sheet may e.g. for fixing with respect to the mat be provided with cut outs at least nearby two corners of the mat. Other possible attachment means can exist of protrusions, caps, buckles, "Velcro" tape and the like. On the cover sheet may e.g. also be attached stiffening edges, which may be pressed around at least two opposite edges of the mat. The web material of the cover sheet could also be of elastic

30

35

- 2 -

characteristics so as to assure that the cover sheet can be pulled tight automatically. All means by which the cover sheet can be pulled relatively tight around the mat may be provided with reinforcing elements, e.g. against tearing.

5

The material of which the cover sheet according to the invention is made, has an operation comparable to a sponge. That is to say, it must quickly be able to absorb dirt and/or moist. So the cover/sheet must have sufficient capacity for absorption and/or adsorption.

10

Preferably the material of the cover sheet is made of any kind of towel material or non woven material that is suitable for domestic use, for instance material of which so called kitchen towels are made. It can be either from natural or synthetic material. Examples of this material are kitchen towels which are sold under brandnames like Sorbo and Dubro-Ballerina. Preferably the material of the cover sheet, consisting of approximately 85% viscose and approximately 15% polypropylene, has such characteristics that the ability to absorb dirt and/or moist increases during its use.

20

If desired the cover sheet may be provided with a stylish printed design. In doing so the cover sheet can serve an aesthetic and/or indicative function. According to the invention a thus printed cover sheet could serve as a stylish element; e.g. depending on the applicable season it could be provided with a printed wish such like Happy Easter, Happy New Year etc. or it could be decorated in accordance to the interior (e.g. denims, checks, stripes, paisleys etc.). According to the invention a printed cover sheet could also serve as an instructive element, e.g. with an instruction to step on the cover sheet (with the accompanying mat) when entering or leaving specific room spaces (quarantine).

25

30

35

If a cover sheet is not only meant for disposal use but also for reuse, than it should at least be washable, e.g. in a washing machine or under a hot water tap such as is with a kitchen towel. A cover sheet according to the invention once fitted around the mat should also be suitable for sprinkling and/or impregnating, e.g. with a suitable cleaning or disinfecting agent.

A cover sheet according to the invention is suitable for all kinds of

- 3 -

purposes, in and around the house, in the office and in industrial buildings, when there is a desire to clean one's footwear or feet. Conceivable is the use as a bath mat, as a car mat, as a mat behind a hatch where an animal needs to walk over. In the last example one needs not only think of domestic animals, but also of animals, cattle, pigs etc. moving in to a space that needs to remain clean.

The cover sheet according to the invention may have more than one side to be used. The cover sheet may be used double sided or inside out. Also the cover sheet could consist of several (removable) layers, which may be used one by one without having to remove the basic cover sheet (partially) of the mat.

The invention is exemplified more in detail in two embodiments of a cover sheet.

Fig. 1 is a perspective upper view of a mat;

Fig. 2 is a perspective bottom view of the mat in fig. 1 now provided with a cover sheet according to the invention;

Fig. 3 is a perspective upper view of the mat in fig. 1 now provided with a cover sheet according to fig. 2; and

Fig. 4 is a perspective view of the mat in fig. 1 provided with another design of a cover sheet according to the invention.

A well known mat 1, see fig. 1, can be any kind of applied mat, e.g. a door mat or a bath mat and it can be made out of any kind of material, e.g. out of coconut fibre or out of rubber. The mat 1 may have any shape; fig. 1 shows a rectangular mat. Mat 1 may have any desired dimension. Furthermore the surface of the mat 1 may be smooth or rough, or it may be provided with ornamental or useful profiles.

Circumferentially around the mat 1, see fig. 2, the edges of a cover sheet 2 are pulled tight. The cover sheet 2 is made out of material as is being used for kitchen towels. In this embodiment the edge of the cover sheet is provided with an elastic tape, sewn in.

In fig. 3 the mat 1 in fig. 1 is provided with a cover sheet 2 according to the invention. In this embodiment the cover sheet 2 is provided on and around the mat in a rather tight and smooth manner.

- 4 -

5 The combination in fig. 4 shows the mat 1 in fig 1, now provided with a second embodiment of the cover sheet 4 according to the invention. The cover sheet 4 is provided with four triangular cut outs 5 located at the corners 6 of the mat 1. Here the cover sheet 4 may be placed on the mat 1 loose on top of it, whereafter the cover sheet 4 can be pulled tight around the edges 6 of the mat 1.

10 For all embodiments it applies that after the cover sheet 1, 4 becomes dirty, it can be taken off the mat and if necessary be washed for reuse.

15 The invention also concerns the combination of a cover sheet according to the invention provided with a mat. Included hereby also is a cover sheet according to the invention which can be applied all around a door mat, as well as a cover sheet according to the invention, which forms part of a door mat.

- 5 -

CLAIMS

- 5 1. Cover sheet used for covering a walking surface, in particular a door mat, characterized in that the cover sheet is provided with first means to attach the cover sheet to and circumferentially around the walking surface in a rather tight and smooth manner with the purpose to keep it in its place in relation to the walking surface while it is in use.
- 10 2. Cover sheet according to claim 1, characterized in that it is made from a (web) material that has sufficient capacity for absorption- and/or adsorption.
- 15 3. Cover sheet according to claim 2, characterized in that the material moreover has a strong capacity for attaching dirt and/or absorption of water.
- 20 4. Cover sheet according to any one of the preceding claims, characterized in that the surface of the cover sheet is provided with a printed design.
5. Cover sheet according to any one of the preceding claims, characterized in that the cover sheet is made washable for its reuse.
- 25 6. Cover sheet according to any one of the preceding claims, characterized in that the cover sheet, having been accommodated around the walking surface, thereafter is provided with an impregnating agent.
- 30 7. Cover sheet according to any one of the preceding claims, characterized in that the material of which the cover sheet is made, is impregnated with an agent to further cleaning or disinfection.
8. Cover sheet according to any one of the preceding claims, characterized in that the cover sheet can be used on one or both sides.
- 35 9. Cover sheet according to any one of the preceding claims, characterized in that the cover sheet consists of several layers, particularly removable layers.

- 6 -

5

10. Cover sheet according to any one of claims 1-9, characterized in that the cover sheet is made of kitchen towel material whereas the door mat is provided with second means by which its edge, e.g. by means of an elastic strip, is fixed, in particular pulled tight along the edge of the door mat.

11. A combination of a door mat and a cover sheet according to any one of the preceding claims.

1/1

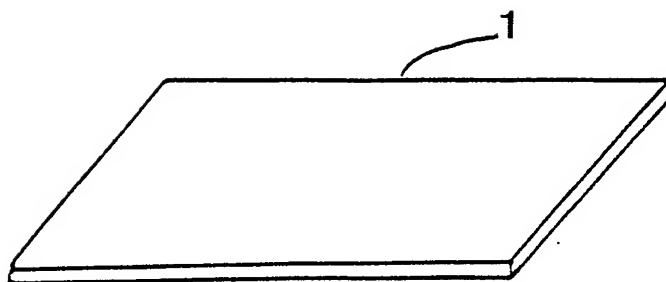


Fig. 1

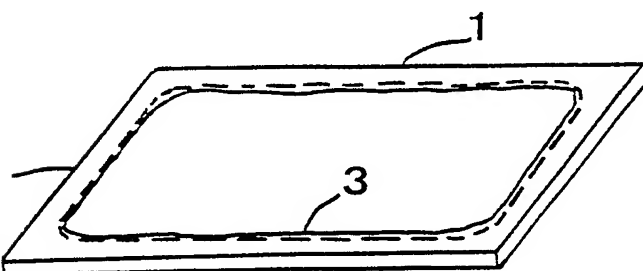


Fig. 2

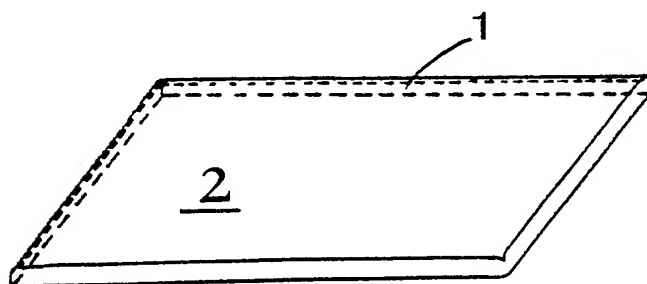


Fig. 3

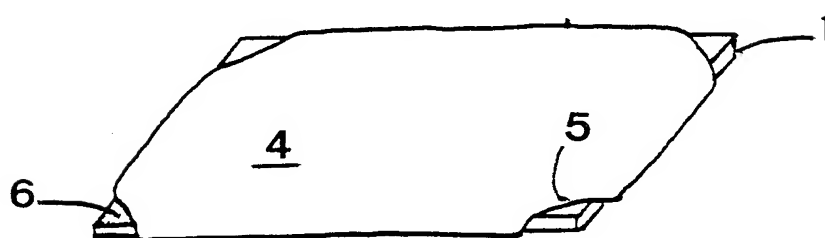


Fig. 4

INTERNATIONAL SEARCH REPORT

International Application No

PCT/NL 98/00548

A. CLASSIFICATION OF SUBJECT MATTER
IPC 6 A47L23/26 A47L23/24

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 6 A47L A47G

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category °	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 3 663 980 A (R. H. CONKLIN) 23 May 1972 see the whole document ---	1-3,5, 10,11
X	BE 422 512 A (A. MATHIEU) see the whole document ---	1-3,5,6, 11
A	---	7,8
X	DE 94 03 946 U (DS PRODUKTE DIETER SCHWARZ GMBH) 5 May 1994 see the whole document ---	1,5,11
X	DE 87 17 001 U (R. SCHOMAKER) 3 March 1988 see the whole document ---	1,2,11
	--- -/--	

☒ Further documents are listed in the continuation of box C.

☒ Patent family members are listed in annex.

° Special categories of cited documents :

"A" document defining the general state of the art which is not considered to be of particular relevance

"E" earlier document but published on or after the international filing date

"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)

"O" document referring to an oral disclosure, use, exhibition or other means

"P" document published prior to the international filing date but later than the priority date claimed

"T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention

"X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

"Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art.

"&" document member of the same patent family

Date of the actual completion of the international search

12 January 1999

Date of mailing of the international search report

21/01/1999

Name and mailing address of the ISA

European Patent Office, P.B. 5818 Patentlaan 2
NL - 2280 HV Rijswijk
Tel. (+31-70) 340-2040, Tx. 31 651 epo nl,
Fax: (+31-70) 340-3016

Authorized officer

Bourseau, A-M

INTERNATIONAL SEARCH REPORT

International Application No

PCT/NL 98/00548

C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category °	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	US 2 843 868 A (B. W. BORGSTROM) 22 July 1958 see the whole document ----	4,9
A	EP 0 033 448 A (DEPHARMA AG) 12 August 1981 see the whole document ----	2-4,6,7
P,X	DE 196 25 533 A (J. EISWEILER) 2 January 1998 see page 1, line 29 - line 45 see column 1, line 65 - column 2, line 14 see column 2, line 45 - line 53 see column 4, lines 4-14,23-30, 57-61 see claims 1-7; figure 1 -----	1-3,5,8, 10,11
A		4,6,7

INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

PCT/NL 98/00548

Patent document cited in search report		Publication date	Patent family member(s)	Publication date
US 3663980	A	23-05-1972	NONE	
BE 422512	A		NONE	
DE 9403946	U	05-05-1994	NONE	
DE 8717001	U	03-03-1988	NONE	
US 2843868	A	22-07-1958	NONE	
EP 0033448	A	12-08-1981	AU 7370681 A WO 8200085 A	02-02-1982 21-01-1982
DE 19625533	A	02-01-1998	NONE	